

# Energy Conservation: College -- No. 816611

Category  
Agency  
Planning Area  
Relocation Impact

Montgomery College  
Montgomery College  
Countywide

Date Last Modified  
Previous PDF Page Number  
Required Adequate Public Facility

February 21, 2006  
20-7 (05 App)  
NO

## EXPENDITURE SCHEDULE (\$000)

Cost Element	Total	Thru FY05	Est. FY06	Total 6 Years	FY07	FY08	FY09	FY10	FY11	FY12	Beyond 6 Years
Planning, Design and Supervision	1,628	1,510	118	0	0	0	0	0	0	0	0
Land											
Site Improvements and Utilities	59	59	0	0	0	0	0	0	0	0	0
Construction	2,601	1,834	17	750	125	125	125	125	125	125	0
Other	130	130	0	0	0	0	0	0	0	0	0
<b>Total</b>	<b>4,418</b>	<b>3,533</b>	<b>135</b>	<b>750</b>	<b>125</b>	<b>125</b>	<b>125</b>	<b>125</b>	<b>125</b>	<b>125</b>	<b>0</b>

## FUNDING SCHEDULE (\$000)

G.O. Bonds	2,324	1,439	135	750	125	125	125	125	125	125	0
Current Revenue:											
General	1,994	1,994	0	0	0	0	0	0	0	0	0
Federal Aid	49	49	0	0	0	0	0	0	0	0	0
State Aid	51	51	0	0	0	0	0	0	0	0	0

## ANNUAL OPERATING BUDGET IMPACT (\$000)

Maintenance				-105	-5	-10	-15	-20	-25	-30	0
Energy				-315	-15	-30	-45	-60	-75	-90	0
Program-Staff				0	0	0	0	0	0	0	0
Program-Other				0	0	0	0	0	0	0	0
Offset Revenue				0	0	0	0	0	0	0	0
Net Impact				-420	-20	-40	-60	-80	-100	-120	0
Workyears				0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0

## DESCRIPTION

This project provides funding to (1) continue development of a Collegewide energy management program, (2) implement life-cycle cost effective energy conservation measures based upon energy audits, and (3) review new building/renovation designs for compliance with Montgomery County Code, Ch. 8 Building Energy Performance Standards. Typical project activities include retrofits and modifications of lighting, controls, and HVAC equipment; building envelope modifications; solar energy retrofits; computer equipment for equipment control and energy-use monitoring; HVAC system evaluation/balancing studies; long-range energy/utility planning studies; central plant design plans (GT, TP/SS); and waste management studies. Typical payback on lighting, controls, HVAC and solar energy modifications is five to six years.

## JUSTIFICATION

As mandated by Ch. 8 of the County Code and supported by the College, County Council, the Interagency Committee on Energy & Utility Management (ICEUM), and the Citizens Energy Conservation Advisory Committee (ECAC), an energy cost reduction program has been developed. This program consists of energy audits performed by College staff to identify life cycle cost effective retrofits, including a lighting retrofit program.

## STATUS

Continuing project. New construction and building renovation projects under review during FY07-08 include the Takoma Park Campus expansion and planning for new buildings on the Rockville and Germantown campuses. Campus utilities master plans were completed in FY90 (RV) and FY92 (TP/SS and GT), and were updated in FY05. This project is coordinated with the outcome of the Collegewide Facilities Condition Assessment (8/02).

## OTHER

The following fund transfers have been made from this project: \$21,420 to Central Plant Distribution System project (#886676) (BOT Resolution #90-102 (6/18/90)); \$70,000 to Fine Arts Renovation (#906601) (BOT Resolution #94-114 (9/19/94)), and \$7,000 to Planning, Design & Construction project (#906605) (BOT Resolution #01-153 (10/15/01)). Beginning in FY98, the portion of this project funded by County Current Revenues migrated to the College's Operating Budget. It is anticipated that migration of this portion of the project will promote a desirable consistency with County budgeting practices and encourage greater competition in an environment of scarce resources. Reflecting the migration of this portion of the project, the College's Operating Budget includes funds for this effort.

FY2007 Appropriation: \$125,000 (G.O. Bonds).

\* Project expenditures will continue indefinitely.

## APPROPRIATION AND EXPENDITURE DATA

Date First Appropriation	FY81	(\$000)
Initial Cost Estimate		1,008
First Cost Estimate		
Current Scope	FY02	3,918
Last FY's Cost Estimate		4,168
Present Cost Estimate		4,418

Appropriation Request	FY07	125
Appropriation Req. Est.	FY08	125
Supplemental		
Appropriation Request	FY06	0
Transfer		0

Cumulative Appropriation	3,668
Expenditures/	
Encumbrances	3,637
Unencumbered Balance	31

Partial Closeout Thru	FY04	0
New Partial Closeout	FY05	0
Total Partial Closeout		0

## COORDINATION

This project is coordinated with the scheduled building renovations on the Rockville and Takoma Park/Silver Spring Campuses, and the planned construction of new buildings on the Rockville, Germantown and Takoma Park/Silver Spring Campuses.

## ICEUM & ECAC

Facility Planning: College (#886686)  
PLAR: College (CIP#926659)  
Roof Replacement: College (CIP#876664)  
Takoma Park Central Plant (CIP#016600)  
King Street Art Center (CIP#056604)

## MAP

